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## Abstract

A radio modem is connectable to a booster unit to boost the power of the transmitted RF signal. In order to detect the presence or absence of the booster unit, a DC offset is placed on the connector line between the radio modem and the booster unit. The value of the DC offset depends upon whether the booster unit is connected and this DC value can be detected at the radio modem. Baseband signals are sent on the connector line between the radio modem and the booster unit. The baseband signals can include a power control message which allows the booster unit to determine the power level to transmit. Additionally, a switch placed in the transmit line of the booster unit to prevent the input to a power amplifier in the booster to be destructively high if the radio modem unit does not correctly detect the connection to the booster unit.